

AMENDMENTS TO THE CLAIMS

1. (Previously presented) A method for the continuous gravimetric metering of flowing materials for burner systems, with the instantaneous mass flow being determined and the metering occurring with a metering device, wherein

the type of each flowing material is determined, the known individual calorific value from the type of each flowing material is determined and the instantaneous calorific value of the flowing materials is determined from the determination of the mass flow and the output from the metering device is regulated in adjustment to the set-point conveying rate depending on the instantaneous calorific value.

2. (Previously presented) A method according to claim 1, wherein the determination of type of flowing material is carried out by way of NIR spectroscopy.

3. (Previously presented) A method according to claim 1, wherein the flowing materials are plastic materials.

4. (Previously presented) A method according to claim 1, wherein the output of the metering device is regulated by taking into account the distance between metering device and burner system.

5. (Previously presented) A method according to claim 1, wherein the output of the metering device is controlled or regulated by changing the speed of the metering device.

6. (Previously Presented) A method according to claim 1, wherein the output of the metering device is regulated in the case of pneumatic conveyance by changing the air quantity and/or air speed.

7. **(Currently amended)** An apparatus for the continuous gravimetric metering of flowing materials for burner systems, with the instantaneous mass flow being determined and with the flowing materials being metered by means of a metering device, wherein

there are provided a material recognition system for determining any kind of flowing material, a computer unit ~~for determining~~ configured to receive information from the material recognition system and to determine the instantaneous calorific value of the flowing materials, and a metering control unit ~~with which the output of the metering device is adjusted~~ configured to adjust the output of the metering device to the set-point conveying rate ~~depending based~~ on the instantaneous calorific value.

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8. (Previously presented) An apparatus according to claim 7, wherein the material recognition system comprises a contactless material sensor and a radiation source with which the flowing material can be irradiated with a radiation to which the material sensor is sensitive.

9. (Previously presented) An apparatus according to claim 8, wherein the material sensor is an NIR spectroscopic sensor and the radiation source emits light in the near-infrared range, especially that the radiation source is a halogen lamp.

10. (Previously presented) An apparatus according to claim 7, wherein the material recognition system is arranged directly before the metering device.

11. (Cancelled).

12. (Cancelled).

13. (Previously presented) An apparatus according to claim 7, wherein the flowing materials are plastic materials.

14. (Previously presented) An apparatus according to claim 7, wherein the burner system is a rotary kiln for cement production.

15. (Previously presented) An apparatus according to claim 7, wherein the metering device and the flow meter form a unit, especially a rotary metering weigher.